

Attorney's Docket No. 5577-233
Application Serial No. 09/862,968
Filed: May 22, 2001
Page 17

REMARKS

Applicants appreciate the thorough review of the present application as reflected in the Final Office Action mailed May 3, 2005. In particular, Applicants appreciate the Examiner's indication that Claims 12, 25, 31, 33 and 35 would be allowable if rewritten in independent form. Applicants have rewritten Claims 12, 25, 31, 33 and 35 in independent form and, therefore, submit that these claims and the claims that depend therefrom are in condition for allowance. Applicants submit that the remaining claims are patentable over the cited references for at least the reasons stated herein.

The IDS Submitted September 13, 2004

As requested in the Final Office Action, Applicants have provided herewith a copy of the Information Disclosure Statement (IDS) and 1449 submitted to the Patent Office on September 13, 2004. For the Examiner's reference, Applicants have also included a copy of the return receipt postcard associated with the IDS indicating receipt of the IDS and the 1449 form at the Patent Office on September 15, 2004. Applicants respectfully request that the Examiner return an initialed copy of the PTO-1449 form submitted with the September 13, 2004 IDS indicating consideration of the cited references in any subsequent communication.

The Claims Are Patentable Over Barrera

Claims 1-11, 13-17, 19-24, 26-30, 32, 34 and 36-47 stand rejected under 35 U.S.C. § 103(a) as obvious in light of United States Patent No. 6,247,057 to Barrera, III (hereinafter "Barrera"). Applicants submit that these claims are patentable over Barrera for at least the reasons discussed in Applicants response of January 20, 2005. In the interest of brevity, Applicants will not repeat the arguments set out in their response of January 20, 2005. However, the arguments made in Applicants response of January 20, 2005 are incorporated herein by reference as if set forth in their entirety. Accordingly, Applicants will limit the arguments made herein to respond to the "Response to Amendment" section in the Final Office Action.

The Final Office Action points to several portions of Barrera to contradict Applicants

Attorney's Docket No. 5577-233
Application Serial No. 09/862,968
Filed: May 22, 2001
Page 18

argument that Barrera fails to teach assigning or selecting a port for a connection utilizing a common network address. See Final Office Action pages 2 – 3. As stated in Applicants' response of January 20, 2005, Barrera discusses associating different service instances with different predefined ports and then mapping the IP address of the request to the predefined ports so as to differentiate between service requests that would otherwise use the same port. See Barrera, col. 6, line 39 to col. 7, line 13. Barrera describes an endpoint ID creator that establishes the relationship between the designated endpoint IDs (e.g. the globally known port for the type of service) and the new endpoint ID (e.g. the remapped port for a particular instance of a virtual service). See Barrera, col. 8, lines 34-52. Thus, Barrera appears to relate to mapping of incoming requests to multiple service instances that share a common port identification from the requestor's perspective. The mapping is not made on a connection by connection basis, but appears to be static once established and does not appear to be responsive to a connection being established but, rather, is responsive to a service starting. In contrast to the re-mapping system of Barrera, embodiments of the present invention relate to port selection on a connection level basis for connections originated by applications that share a common network address.

Each of the portions of Barrera cited in the Final Office Action discuss "service level" not "connection level" assignments. For example, column 3, lines 21-27 of Barrera discusses "virtual services." Furthermore, the Final Office Action states:

This step of generating and assigning a port for connection to a virtual service equates to the claimed limitation call for selecting a port for a connection. Although it appears to the client side that different IP addresses for virtual services are used, at a lower level however the same common IP address, i.e., real server IP address, would be used to route the application request to the correct location.

See Final Office Action, page 3. Applicants respectfully disagree. In particular, Barrera appears to relate to a system for allowing requests to multiple services that would otherwise use the same port. See Barrera, col. 6, lines 8-33. Again, in contrast to the re-mapping system of Barrera, embodiments of the present invention relate to port selection on a connection level basis for connections originated by applications that share a common network address. Furthermore, the

Attorney's Docket No. 5577-233
Application Serial No. 09/862,968
Filed: May 22, 2001
Page 19

Final Office Action does not point to any portion of the reference or any teaching in the art to support the statements in the Final Office Action set out above.

Accordingly, Barrera relates to mapping incoming requests for use of a service to multiple instances of the service, not to assignments of ports for connections initiated by the services. As such, Applicants submit that the Final Office Action has failed to establish that Barrera discloses or suggests "a method of assigning a port for a connection originated by one of multiple application instances, the multiple application instances executing on different data processing systems and utilizing a common network address" as recited in Claim 1. Thus, Claim 1 is patentable over the cited references for at least these additional reasons.

Furthermore, the Final Office Action does not address Applicants' argument that the previous Office Action does not address the language of Claim 1 that recites that the multiple application instances utilize a common network address. As is clear from a reading of Barrera, the IP addresses appear to be different for the different instances of a service, but the ports are the same. In contrast, Claim 1 recites that the multiple application instances utilize a "common network address" and that the selected port is used "for the connection utilizing the common network address." Applicants submit that none of the cited portions of Barrera disclose or suggest the selection of ports for connections utilizing a common network address as recited in Claim 1. Thus, Claim 1 is patentable over the cited references for at least these additional reasons.

The Final Office Action further fails to address Applicants' argument that the previous Office Action fails to address the language of Claim 1 that recites "providing an indication of available ports for the common network address to each of the different data processing systems executing the multiple application instances." In particular, neither Office Action addresses the recitations that the indication is provided "to each of the different data processing systems executing the multiple application instances," but merely cites to a portion of Barrera that discusses a mapping table. The citation to Barrera, col. 8, lines 53-63 does not appear to disclose or suggest that the table is provided to the processing systems executing application instances that are originating connections. As such, Applicants submit that the cited portion of Barrera

Attorney's Docket No. 5577-233
Application Serial No. 09/862,968
Filed: May 22, 2001
Page 20

does not disclose or suggest these recitations of Claim 1. Thus, Claim 1 is patentable over the cited references for at least these additional reasons.

Accordingly, Applicants submit that Claim 1 and the claims that depend from Claim 1 are neither disclosed nor suggested by the cited portions of Barrera for at least the additional reasons stated herein. Recitations corresponding to those of Claim 1 are also found in independent Claims 44 and 46 and, Applicants submit that these claims are also patentable over the cited portions of Barrera for analogous reasons.

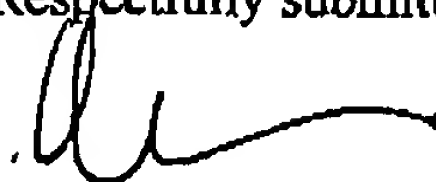
The Final Office Action states that Barrera teaches dynamic virtual IP addresses because Barrera discusses virtual services. However, as stated on page 3 of the present application, a dynamic VIPA may be automatically moved from protocol stack to protocol stack in a predefined manner to overcome failures of a particular protocol stack. Applicants can find no reference or corresponding recitations of the cited portions of Barrera that would disclose or suggest the use of a DVIPA with the system of Barrera. Furthermore, Applicants can find no reference in the cited portions of Barrera that disclose that the indication of available ports is stored in a commonly accessible storage facility where the storage facility is accessible to the data processing systems that are originating the connections. As such, Applicants submit that Claim 13 and the claims that depend from Claim 13 are patentable over the cited portions of Barrera. Recitations corresponding to those of Claim 13 are also found in independent Claims 45 and 47 and, Applicants submit that these claims are also patentable over the cited portions of Barrera for analogous reasons.

Conclusion

In light of the above discussion, Applicants submit that the present application is in condition for allowance for at least the reasons discussed herein and Applicants' response of January 20, 2005. Allowance is respectfully requested in due course. If, in the opinion of the Examiner, a telephonic conference would expedite the examination of this matter, the Examiner is invited to call the undersigned attorney at (919) 854-1400.

Attorney's Docket No. 5577-233
Application Serial No. 09/862,968
Filed: May 22, 2001
Page 21

Respectfully submitted,



Elizabeth A. Stanek
Registration No. 48,568

USPTO Customer No. 46589
Myers Bigel Sibley & Sajovec
Post Office Box 37428
Raleigh, North Carolina 27627
Telephone: 919/854-1400
Facsimile: 919/854-1401